Veto Wall Construction

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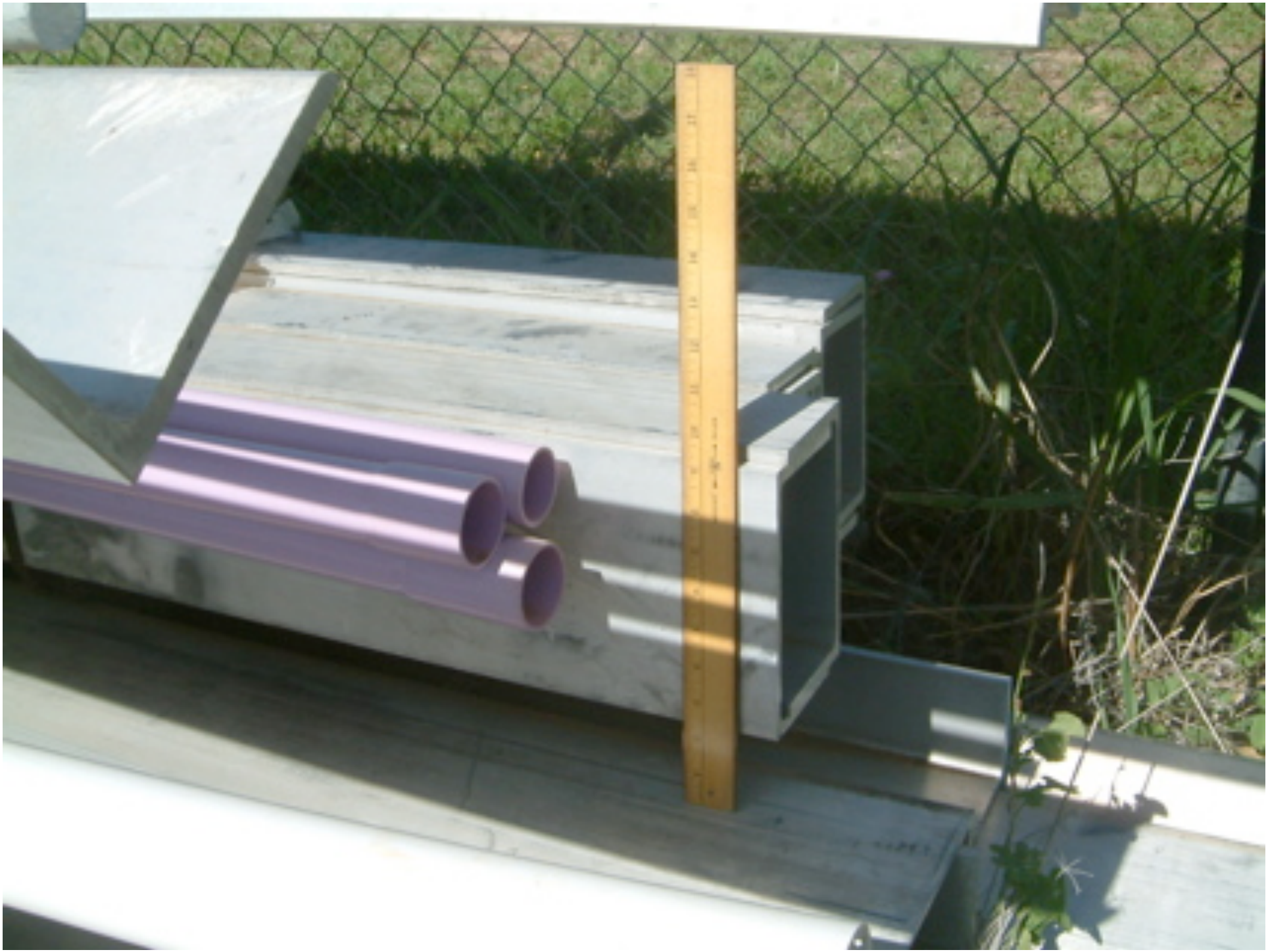
Design

- Where?
  - As close as possible to Plastic Ball?
  - Affects magnetic shielding needed for bases
- Size
  - (1 m^2)?
  - 10-12 scintillators, ~0.6 cm x 10 cm x 100 cm
- Timing resolution (17 ns for a single bucket)
  - Single-ended (ok for timing and noise?)
  - High performance PMT's not needed
- Recycle existing hodoscope(s)?

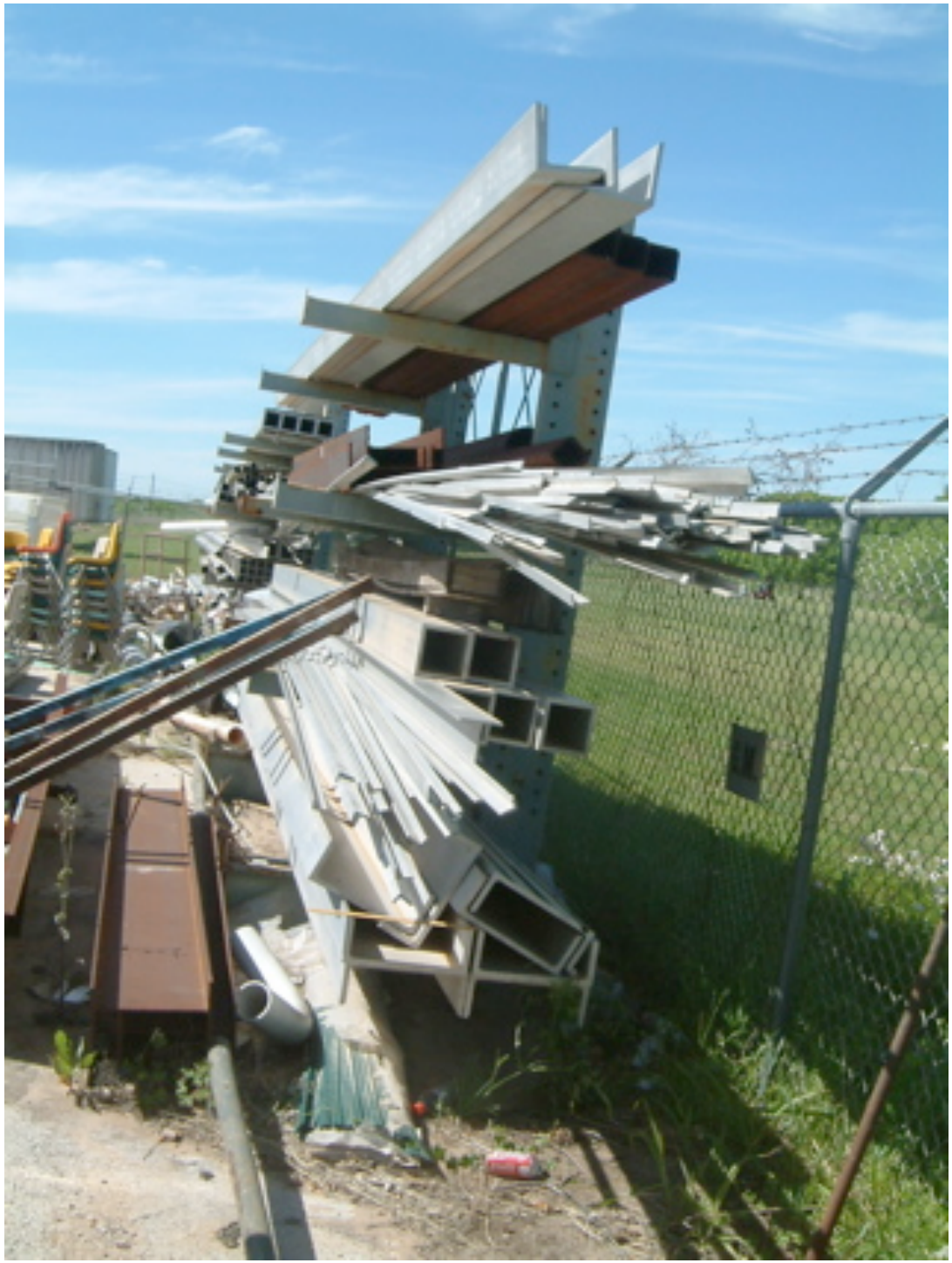
Apparatus

- Scintillator
  - Use existing scintillator, if possible
  - New scintillator, ~$1000 for saw cut, ~$1600 for diamond milled Eljen EN200 (BC408 equivalent)
- Photomultiplier tubes and bases
  - 1.5” or 2” tubes
  - Need spares
  - Shielding
- Mounting apparatus/frame
  - Materials (ACU has aluminum stock)
  - Construction (use of machine shop)
  - Easily removed

Available aluminum stock



Available aluminum stock



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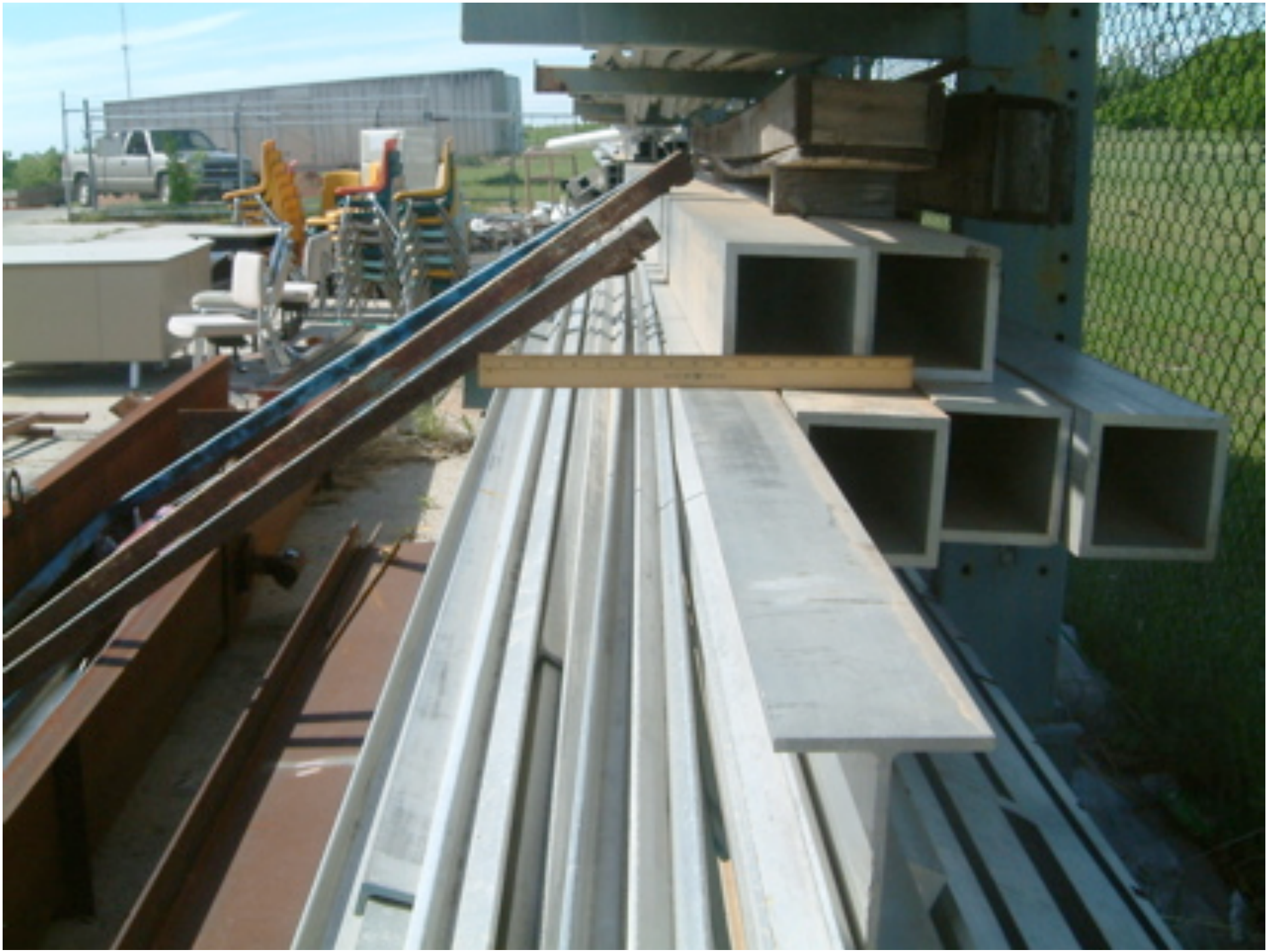

Manpower

- ACU team available ~18 June - 17 August
  - Donald Isenhower
  - 3-4 students
- Student appointments, travel arrangements, housing, etc. need to be completed soon if we send a team to FNAL
- Integration with other tasks (MIPP and E906)

Logistics

- Approval status
- ACU interest/participation contingent on inclusion of a baryon spectroscopy program
  - P_{π} = 1 - 3 GeV/c
  - LH_2 target